5.0 Challenge Inspections

By their nature, challenge inspections would not be considered routine operations. The actions undertaken in these non-routine investigations would be directed toward the identification of prohibited facilities, activities, or chemicals.

A method would be to analyze samples taken from the suspect site. One of the objectives of a challenge inspection could be the collection of data for detecting substances prohibited by the CWC; such known substances are listed in the Schedules. The prohibitions, however, would also extend to all toxic chemicals that would be inconsistent with the purposes of the CWC. The analytical procedures would have to be sophisticated enough to identify trace amounts not only of those chemicals listed in the Schedules, but also of unknown substances. This particular function could require the operation of one or more laboratory facilities equipped with sensitive instruments and having access to an extensive chemical data base. If the laboratory facilities are operated by the Organization, the analytical data base would be part of the information processing system of the Organization. If, on the other hand, the laboratories are operated by member states or other independent organizations on behalf of the Organization, the analytical data base would either be accessible by, or an extension of the central information processing system. The topic of analytical data bases is discussed in a separate paper submitted by the United States.

6.0 Structure of the Information Processing System

As standard operating procedure, official analysis of the data would have to be performed at the headquarters of the Organization, where the authoritative data base would reside, and where the Organization would evaluate the data, although preliminary evaluation of some data might also take place at the site. Therefore, some of the activities of the Organization involving continuous on-site presence of inspectors would require a distributed information processing system with the capability of being interconnected to other systems. Monitoring the destruction of stockpiles is a good example to discuss some of the possible design requirements. Some of the concepts presented in the following paragraphs could also be applicable to other types of facilities; destruction is used only for illustrative purposes.

The proper operation of the destruction facility would be the responsibility of the State Party. The facility would use appropriate monitoring and control equipment and procedures to ensure safe and effective operation. At the time of the initial declaration, the design of the facility, the equipment and procedures would be approved by the Organization. During destruction of stockpiles, the role of the Organization would be to verify that a) the facility is operated as intended, and b) the